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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/847,384	05/03/2001	Jari Hovinen	TUR-106	6081

7590

05/01/2003

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EXAMINER

LEWIS, PATRICK T

ART UNIT

PAPER NUMBER

1623

10

DATE MAILED: 05/01/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/847,384

Applicant(s)

HOVINEN ET AL.

Examiner

Patrick T. Lewis

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 1 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10 February 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-13 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☐ Claim(s) _____ is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☒ Claim(s) 1-13 are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____
- 4) ☒ Interview Summary (PTO-413) Paper No(s). 10
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

DETAILED ACTION***Election/Restrictions***

1. The restriction requirement set forth in the Office Action dated October 3, 2002 has been withdrawn. A new restriction requirement is set forth herein.

2. Restriction to one of the following inventions is required under 35 U.S.C. 121:

I. Claims 1-4 and 8-12, drawn to a labeling reactant of formula (I) wherein Z

is , classified in class 540, subclass 1+.

II. Claims 1-4 and 8-10, drawn to a labeling reactant of formula (I) wherein Z

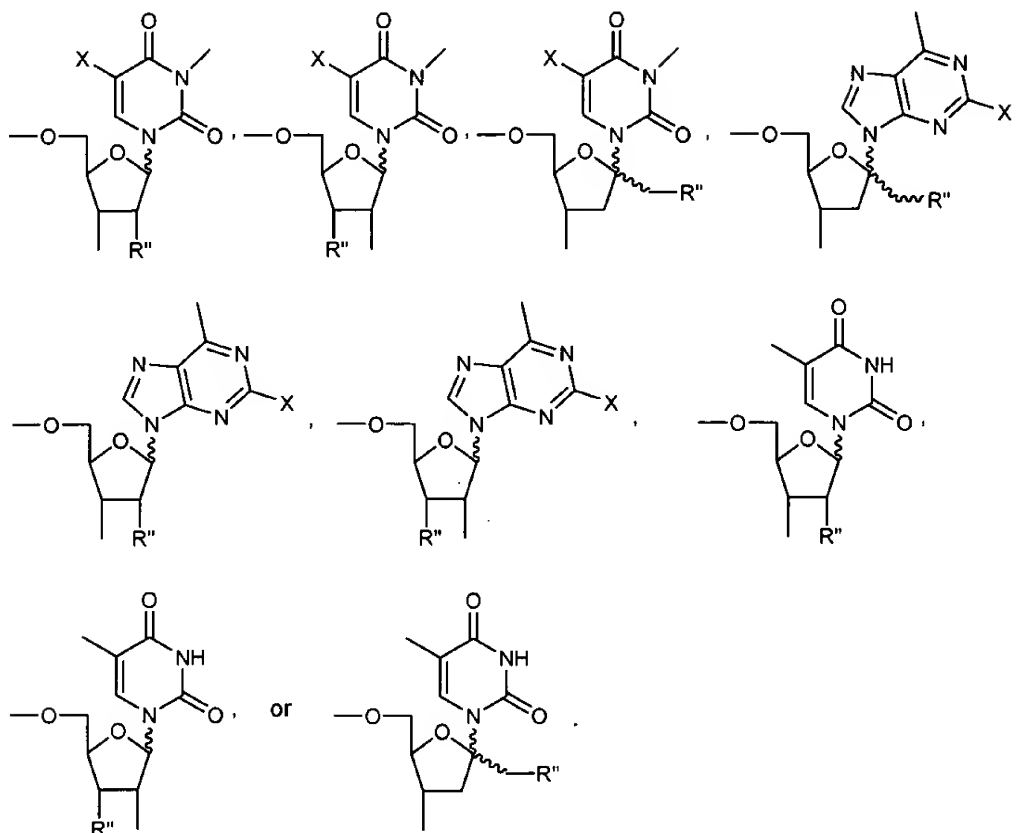
is  or , classified in class 540, subclass 1+.

III. Claims 1-4 and 8-10, drawn to a labeling reactant of formula (I) wherein Z

is  or , classified in class 540, subclass 1+.

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IV. Claims 1-11, drawn to a labeling reactant of formula (I) wherein Z is



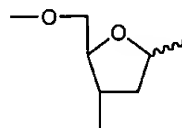
classified in class 536, subclass 22.1, 26.1; class 546, subclass 22.

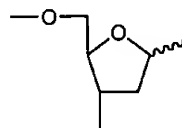
V. Claims 1-4 and 8-10, drawn to a labeling reactant of formula (I) wherein Z is trivalent derivatives, substituted or unsubstituted, of cyclohexane, cyclohexene, cyclohexadiene, phenyl, cyclopentane, cyclopentene, cyclopentadiene, cyclobutane, cyclobutene, or cyclobutadiene, classified in class 540, subclass 1+; class 552, subclass 291, 293.

VI. Claims 1-4 and 8-10, drawn to a labeling reactant of formula (I) wherein Z is aziridine, diaziridine, oxetane, thietaneazete, azetidine, 1,2-dihydro-1,2-diazete, 1,2-diazetidene, furan, tetrahydrofuran, thiophene, 2,5-dihydrothiophene, thiolane, selenophene, pyrrole, pyrrolidine, phosphole,

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1,3-dioxolane, 1,2-dithiole, 1,2-thiolane, 1,3-dithiole, 1,3-dithiolane, oxazole, 4,5-dihydrooxazole, isoxazole, 4,5-dihydroisoxazole, 2,3-dihydroisoxazole, thiazole, isothiazole, imidazole, imidazolidine, pyrazole, 4,5-dihydropyrazole, pyrazolidine, triazole, pyran, pyran-2-one, 3,4-dihydro-2H-pyran, tetrahydropyran, 4H-pyran, pyran-4-one, pyridine, pyridone, piperidine, phosphabenzene, 1,4-dioxin, 1,4-dithiin, 1,4-oxathiin, oxazine, 1,3-oxazinone, morpholine, 1,3-dioxane, 1,3-dithiane, pyridazine, pyrimidine, pyrazine, piperazine, 1,2,4-triazine, 1,3,5-triazine, 1,3,5-triaza-



cyclohexane-2, 4, 6-trione or , classified in class 544, subclass 1+; class 546, subclass 1+, 22; class 540, subclass 1+.

- VII. Claim 13, drawn to a method for direct attachment of a conjugate group to an oligonucleotide structure enabling the attachment of a desired number of these groups during chain assembly characterized in that it comprises a Mitsunobu alkylation of a compound of formula (II), classified in class 536, subclass 25.32.

The inventions are distinct, each from the other because of the following reasons:

3. Inventions I, II, III, IV, V, and VI are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant case Inventions I, II, III, IV, V, and VI have different structural cores. A search for compounds of Group I, II, III, IV, V, or VI will not necessitate a

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search for compounds for the other groups, further, a reference rendering Group I, II, III, IV, V, or VI obvious will not render compounds of the other groups obvious. Applicant is not entitled to examination of multiple compounds. This indeed would place undue burden upon the examiner in charge of this application.

4. Inventions (I, II, III, V, or VI) and VII are unrelated. Inventions are unrelated if it can be shown that they are not disclosed as capable of use together and they have different modes of operation, different functions, or different effects (MPEP § 806.04, MPEP § 808.01). In the instant the method of Group VII is drawn to the use of patentably distinct compounds that are not members of Group I, II, III, V, or VI.

5. Inventions IV and VII are related as product and process of use. The inventions can be shown to be distinct if either or both of the following can be shown: (1) the process for using the product as claimed can be practiced with another materially different product or (2) the product as claimed can be used in a materially different process of using that product (MPEP § 806.05(h)). In the instant case the products can be used as dyes or in assays.

6. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their recognized divergent subject matter, restriction for examination purposes as indicated is proper. It would indeed impose an undue burden upon the examiner in charge of this application if the instant restriction and species requirement were not advanced as set forth herein.

7. This application contains claims which recite numerous patentably distinct labeling reactants. Regardless of whether Groups I, II, III, IV, V, VI, or VII above is

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chosen. Applicant is additionally required under 35 U.S.C. 121 to elect a single disclosed species of labeling reactant for prosecution on the merits to which the claims shall be restricted if no generic claim is finally held to be allowable. Currently, all claims are generic or subgeneric.

Applicant is advised that a reply to this requirement must include an identification of the species that is elected consonant with this requirement, and a listing of all claims readable thereon, including any claims subsequently added. An argument that a claim is allowable or that all claims are generic is considered nonresponsive unless accompanied by an election.

Upon the allowance of a generic claim, applicant will be entitled to consideration of claims to additional species which are written in dependent form or otherwise include all the limitations of an allowed generic claim as provided by 37 CFR 1.141. If claims are added after the election, applicant must indicate which are readable upon the elected species. MPEP § 809.02(a).

Should applicant traverse on the ground that the species are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the species to be obvious variants or clearly admit on the record that this is the case. In either instance, if the examiner finds one of the inventions unpatentable over the prior art, the evidence or admission may be used in a rejection under 35 U.S.C. 103(a) of the other invention.

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Applicant is advised that the reply to this requirement to be complete must include an election of the invention to be examined even though the requirement be traversed (37 CFR 1.143).

Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

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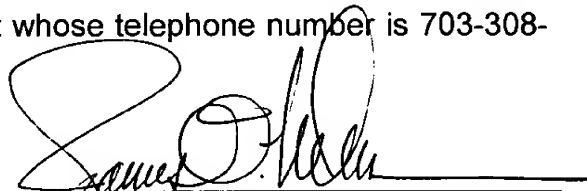
Contacts

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Patrick T. Lewis whose telephone number is 703-305-4043. The examiner can normally be reached on M-F 10:00 am to 5:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James O. Wilson can be reached on 703-308-4624. The fax phone numbers for the organization where this application or proceeding is assigned are 703-305-3014 for regular communications and 703-305-3014 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-0196.

Patrick T. Lewis, PhD
Examiner
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James O. Wilson
Supervisory Patent Examiner
Technology Center 1600

ptl
April 30, 2003